WHAT IS CLAIMED IS:

1. An anisotropically conductive sheet that exhibits conductivity in its thickness-wise direction, which comprises a semiconductive part that exhibits semiconductivity in the plane direction of the sheet.

2. The anisotropically conductive sheet according to Claim 1, wherein the volume resistivity of the semiconductive part is 10^{-7} to 10^{4} Ωm.

3. The anisotropically conductive sheet according to Claim 1, wherein the surface resistivity of the semiconductive part is 10^{-1} to 10^{10} $\Omega/\square$.

4. An anisotropically conductive sheet comprising a plurality of conductive parts each extending in the thickness-wise direction of the sheet and semiconductive parts each exhibiting semiconductivity in the plane direction of the sheet and formed so as to surround each of the conductive parts.

5. An anisotropically conductive sheet comprising a plurality of conductive parts each extending in the thickness-wise direction of the sheet, insulating parts formed so as to surround each of the conductive parts, and semiconductive parts each exhibiting semiconductivity in the plane direction of the sheet and formed so as to

surround each of the insulating parts.

6. An anisotropically conductive sheet comprising a base sheet exhibiting semiconductivity in its plane direction and conductive particles contained in the base sheet in a state oriented so as to be arranged in the thickness-wise direction of the base sheet.

7. The anisotropically conductive sheet according to Claim 1, wherein the semiconductive parts or base sheet contains at least one conductive substance selected from among conductive organic substances, amine type organic conductive substances, conductive polymers, metallic particles and carbon black.

8. The anisotropically conductive sheet according to Claim 1, wherein the semiconductive parts or base sheet contains a sodium salt of an alkylsulfonic acid as a conductive substance.

9. A process for producing the anisotropically conductive sheet according to Claim 4, which comprises the steps of forming a sheet-forming material layer with conductive particles which exhibit magnetism, and a semiconductivity-imparting substance contained in a polymer-forming material which will become an elastic polymeric substance by curing, applying a parallel

magnetic field having an intensity distribution to the sheet-forming material layer in the thickness-wise direction thereof and subjecting the sheet-forming material layer to a curing treatment.

10. A process for producing the anisotropically conductive sheet according to Claim 4, which comprises the steps of providing a sheet for semiconductive part exhibiting semiconductivity, in which through-holes or openings have been formed, forming a layer of a material for conductive part containing conductive particles, which exhibit magnetism, in a polymer-forming material which will become an elastic polymeric substance by curing, in each of the through-holes or openings in the sheet for semiconductive part, applying a parallel magnetic field or a parallel magnetic field having an intensity distribution to the layer of the material for conductive part in the thickness-wise direction thereof and subjecting the layer of the material for conductive part to a curing treatment.

11. A process for producing the anisotropically conductive sheet according Claim 6, which comprises the steps of forming a sheet-forming material layer with conductive particles which exhibit magnetism, and a semiconductivity-imparting substance contained in a polymer-forming material which will become an elastic polymeric substance by curing, applying a parallel

magnetic field to the sheet-forming material layer in the thickness-wise direction thereof and subjecting the sheet-forming material layer to a curing treatment.

12. A connector formed of the anisotropically conductive sheet according Claim 1.

13. A method for inspecting a circuit device, which comprises conducting electrical inspection of the circuit device using the connector according to Claim 12.

14. An anisotropically conductive sheet comprising an anisotropically conductive sheet member having conductivity in its thickness-wise direction and a static charge-eliminating layer integrally provided on at least one surface of the sheet member.

15. An anisotropically conductive sheet comprising an anisotropically conductive sheet member provided with a plurality of conductive parts each extending in the thickness-wise direction of the sheet member in a state mutually insulated by insulating parts, and a static charge-eliminating layer provided on at least one surface of each of the insulating parts in the sheet member.

16. The anisotropically conductive sheet according to Claim 15, wherein the static charge-eliminating layer is

provided on the insulating parts in the sheet member.

17. The anisotropically conductive sheet according to Claim 14, wherein the static charge-eliminating layer is composed of a layer containing a conductive organic substance, amine type organic conductive substance, metal or carbon black, a layer of a thermosetting resin or thermoplastic resin containing a conductive substance therein, or a layer formed of a conductive polymer.

18. The anisotropically conductive sheet according to Claim 14, wherein the static charge-eliminating layer is formed of a metallic layer.

19. The anisotropically conductive sheet according to Claim 14, wherein the static charge-eliminating layer is formed of a layer, which contains a sodium salt of an alkylsulfonic acid.

20. A process for producing the anisotropically conductive sheet according to Claim 14, which comprises the steps of coating a sheet member with a flowable composition for forming a static charge-eliminating layer, which contains a conductive substance and a binder or a curable material which will become a binder to form a coating film, and then subjecting the coating film to a drying treatment and/or a curing treatment, thereby

forming the static charge-eliminating layer.

21. A process for producing the anisotropically conductive sheet according to Claim 14, which comprises the steps of bonding a film for static charge-eliminating layer to become a static charge-eliminating layer to a sheet member, thereby forming the static charge-eliminating layer.

22. A connector formed of the anisotropically conductive sheet according Claim 14.

23. A method for inspecting a circuit device, which comprises conducting electrical inspection of the circuit device using the connector according to Claim 22.

24. An anisotropically conductive sheet comprising an anisotropically conductive sheet member having conductivity in the thickness-wise direction of the sheet member and formed of an elastic polymeric substance, a conductive part for connection to be connected to an external device or terminal of an electronic part, and at least one conductive part for static-charge elimination to be connected to a ground.

25. The anisotropically conductive sheet according to Claim 24, wherein the sheet member is provided with a

plurality of conductive parts for connection each extending in the thickness-wise direction of the sheet member in a state mutually insulated by insulating parts, and the conductive part for static-charge elimination is arranged in a blank region outside a region, in which the conductive part for connection is arranged, in the sheet member.

26. The anisotropically conductive sheet according to Claim 24, wherein the sheet member is constructed by arranging at least one conductive part for static-charge elimination in a state dispersively in the blank region.

27. The anisotropically conductive sheet according to Claim 24, wherein the sheet member is constructed by arranging at least one conductive part for static-charge elimination about the region in which the conductive part for connection is arranged.

28. The anisotropically conductive sheet according to Claim 24, wherein the conductive parts for static-charge elimination contains at least one conductive substance selected from among metallic particles, conductive metal oxides, conductive organic substances and carbon black.

29. The anisotropically conductive sheet according to Claim 24, wherein the conductive parts for static-charge

elimination have the same structure as the conductive part for connection.

30. The anisotropically conductive sheet according to Claim 24, wherein the conductive parts for static-charge elimination have the same composition as the conductive part for connection.

31. A connector formed of the anisotropically conductive sheet according Claim 24.

32. A method for inspecting a circuit device, which comprises conducting electrical inspection of the circuit device using the connector according to Claim 31.